#### **Environmental Protection Agency (EPA) - Office of Wastewater Management**

# Notice of FY 2005 Request for Proposals (RFP) for Projects to be Funded from the Water Quality Cooperative Agreement Allocation EPA Headquarters

Initial Announcement EPA-OW-OWM-05-01

# I. Funding Opportunity Description

# A. Grant Objectives

This funding opportunity solicits proposals from eligible applicants which are for unique and innovative projects that address water and wastewater infrastructure financing innovations, training, and environmental results; water and wastewater infrastructure treatment, practices, efficiencies, and training; emerging pollutants of concern; watershed permitting and trading; storm water programs; municipal wet weather programs; concentrated animal feeding operations (CAFO); National Pollutant Discharge Elimination System (NPDES) program permitting for environmental results; cooling water intake structures; youth and the environment; decentralized wastewater treatment systems; and monitoring and assessment for environmental results. Assistance agreements awarded under Section 104(b)(3) of the Clean Water Act (CWA) may only be used to conduct and promote the coordination and acceleration of activities such as research, investigations, experiments, training, education, demonstrations, surveys, and studies relating to the causes, effect, extent, prevention, reduction, and elimination of water pollution. These activities, while not defined in the statute, advance the state of knowledge, gather information, or transfer information. For instance, "demonstrations" are generally projects that demonstrate new or experimental technologies, methods, or approaches and the results of the project will be disseminated so that others can benefit from the knowledge gained. A project that is accomplished through the performance of routine, traditional, or established practices, or a project that is simply intended to carry out a task rather than transfer information or advance the state of knowledge, however worthwhile the project may be, is not a demonstration. Research projects may include the application of established practices when they contribute to learning about an environmental concept or problem.

EPA intends to make available at least \$200K of the annual appropriation for Water Quality Cooperative Agreements in FY 2005 for projects which address cooling water intake structure issues including technical and environmental studies. The Agency has made available \$800,000 from FY 2001 through FY 2004 for similar studies.

The Office of Wastewater Management at EPA Headquarters has identified several topic areas for priority consideration. These priorities reflect EPA's Strategic Goal 2. Clean and Safe Water, Subobjective 2.2.1 Improve Water Quality on a Watershed Basis. EPA will award Assistance Agreements for research, investigations, outreach, experiments, training, demonstrations, surveys, and studies related to the causes, effects, extent, prevention, reduction, and elimination of water pollution in the subject areas shown below in bold. Funding will be awarded only for the areas as described below.

#### **B.** Topic Areas

# 1. Water and Wastewater Infrastructure Financing Innovations, Training, and Environmental Results

- a. A national training workshop for state government officials and employees on new developments, best practices, trends, and innovative ideas in the programmatic and financial aspects of the Clean Water and Safe Drinking Water State Revolving Fund (SRF) Programs.
- b. Training for state and local officials on infrastructure grant programs, emphasizing federal requirements, project development and monitoring, and joint funding opportunities.
- c. Training for public officials on public-private partnerships that reduce the cost of public water infrastructure, emphasizing new developments and best practices.
- d. Case studies, research projects, and demonstrations to document the benefits of water quality funding, such as wastewater infrastructure funding programs. For example, a study demonstrating the use of biological indices as a tool to measure the health of receiving waters affected by SRF financed wastewater projects.
- e. Research and demonstration of innovations, best practices, and new opportunities in the joint funding of cost-effective small (less than 1 million gallons per day) or decentralized wastewater systems. This would include those for tribal, rural and economically stressed areas.

# 2. Water and wastewater sustainable infrastructure innovations that focus on the four themes of Management, Water Efficiency, Full Cost Pricing, and Watershed Approaches

- a. Educational materials and programs to inform stakeholder groups, state and local officials, the general public, and/or the education community about the importance of sustaining water and wastewater infrastructure.
- b. Management
  - Education, training, outreach, forums, tools, and techniques to facilitate the adoption of strategies for promoting the use of sustainable and efficient wastewater infrastructure applications and management systems. This could include regional or national forums to develop coordinated strategies for facilitating the integration of sustainable management strategies into water and wastewater utilities. It could also include case studies on the benefits of adopting particular sustainable management systems and strategies, emphasizing and quantifying the benefits expected, initial costs and related environmental outcomes.
  - Tools, techniques, training and policies for capacity development

for Tribes, Alaska Native Villages, and rural, small and economically stressed communities to effectively operate and maintain water and wastewater treatment facilities.

# c. Water Efficiency

- Regional workshops designed to demonstrate water recycling and reuse innovations to foster a dialogue among state, local and utility leaders.
- Demonstration of innovative water efficiency programs or techniques to reduce infrastructure costs or municipal water use.

## d. Full Cost Pricing

- Creation of innovative or new rate setting tools for water and wastewater utility operators and fiscal managers to achieve full cost pricing and long term capital investment planning.
- Research into the degree to which full cost pricing widely applied would address the water and wastewater infrastructure gap.
- Training on the application of full cost and conservation pricing for water and wastewater services emphasizing and quantifying the actual costs and benefits of such approaches.
- Research projects, and demonstrations to document the relationship between pricing of water and wastewater services whether by the same or separate entities serving a population. For example, studies could evaluate the extent to which wastewater prices influence water consumption and vice-versa, and how those rate structures influence total revenues sufficient to cover full cost of services. Also studies could evaluate whether full cost pricing for wastewater services is based on volume or other factors, especially when wastewater service is provided by separate authorities and metered water usage may not be available to the wastewater utility.

# e. Watershed Approaches

- Development and demonstration of an effective watershed consensus building model that incorporates input from state officials, local leaders, utility managers and associated municipal entities, and watershed stakeholders to determine a unified watershed priority setting process to focus resources to solve the worst conditions first. This could also include demonstration of an innovative process to support development of watershed-based NPDES permits which effectively addresses watershed needs and meets the environmental goals as supported by stakeholders.
- Demonstration of innovative project priority setting criteria that utilizes watershed data to assist in prioritizing funding decisions for water and wastewater infrastructure projects.
- Case studies that demonstrate and document the benefits of innovative pollution control applications or management

approaches involving water or wastewater utilities to avoid expensive facility upgrades or expansion by identifying less expensive watershed focused improvements that achieve permit limits and other water quality improvements.

- f. Water and wastewater treatment practices, efficiencies and training
  - A national training workshop for state government officials and employees on new developments, best practices, trends, and innovative ideas in the management of biosolids.
  - Tools, techniques, benchmarking, education or training to promote more efficient or cost-effective wastewater treatment, biosolids management, and other systems performance.
  - Tools, techniques, and benchmarking approaches to evaluate the
    effectiveness of stormwater and other wet weather best
    management practices, including measures of the costs and
    environmental benefits of such practices.
  - Evaluation of new piping materials to be used in wastewater collection systems and associated impact on infrastructure life cycle costs.
  - Demonstration of innovative approaches or methods to reduce risk or impact of terrorist or other attacks to integrity and effectiveness of wastewater collections and treatment.

# 3. Emerging Pollutants of Concern

- a. Conduct studies on the presence and fate of emerging pollutants of concern (e.g., endocrine disruptors, pharmaceuticals and personal care products, prions, etc.) in wastewater and biosolids.
- b. Conduct studies on treatability of emerging pollutants of concern in wastewater and sewage sludge.

# 4. Watershed Permitting & Trading

- a. Develop and demonstrate the application of an innovative watershed-based permit with particular emphasis on identifying barriers and obstacles, and develop training and technical assistance tools that will help States and local authorities to address these barriers and obstacles. Proposed projects are expected to include:
  - organizing a watershed approach that produces a watershed permit [total maximum daily load (TMDL) development will not be funded];
  - watershed approaches to storm water permitting;
  - use of a permitting mechanism to simultaneously consider all discharges in a watershed with respect to water quality standards; or

 use of effluent trading focused on point/nonpoint trading as well as other trading options.

# 5. Storm Water Programs

- a. Develop information and tools accessible and useable by State and local authorities that increase efficiencies for managing NPDES storm water programs. Proposed projects are expected to include:
  - development of tools that compare the effectiveness of storm water best management practices (BMPs) in varying circumstances that focus on pollutants of concern, particularly nutrients and sediment;
  - development and demonstration of tools to conduct outreach campaigns to disseminate storm water control information and educational materials to small construction operators;
  - demonstration of state approaches to evaluate municipal programs, including implementation of minimum measures, formats for annual reports, audit protocols, and tracking and reporting systems;
  - development of a model comprehensive monitoring program for Phase II communities that includes documentation of water quality improvements along with a process to focus future implementation efforts; or
  - case studies that examine the long-term costs and benefits of low impact development approaches to storm water control, which evaluate both economic and water quality benefits.

## 6. Municipal Wet Weather Programs

- a. Conduct management system demonstration projects for municipalities to address wet weather operations. Proposals should address Municipal Separate Storm Sewer Systems (MS4s), combined sewer systems, capacity management operations and maintenance (CMOM) programs for sanitary sewers, and/or CMOM programs for sewage treatment facilities. Proposed projects are expected to include:
  - demonstration project that includes protocols for water qualityrelated environmental indicators, with emphasis on physical and biological indicators, that can be used in lieu of wet weather sampling, to assist in evaluating the effectiveness of storm water and other wet weather programs; or
  - demonstration project that addresses water quality and quantity issues in a holistic manner.

# 7. Concentrated Animal Feeding Operations (CAFO)

- a. Develop and demonstrate training and technical assistance tools to increase efficiency in implementing the revised CAFO rule and achieving CAFO-related water quality goals. Proposed projects are expected to include:
  - development of tools for NPDES authorities to: use to identify CAFOs, assist in review of CAFO permit applications/NOIs (Notices of Intent), and assist in review of nutrient management plans; or
  - development of an enhanced manure management planner which would be internet-based, downloadable, and capable of providing agronomic and spatial information for all fifty states.

# 8. NPDES Program Permitting for Environmental Results

- a. Develop and demonstrate innovative adjustments to newly developed etools for State permitting authorities to improve environmental reporting.
   Proposed projects are expected to:
  - demonstrate electronic application and permitting tools that can manage multiple aspects of permit issuance, including calculation of water quality based effluent limits;
  - assist states in identifying and/or developing efficient means to improve data quality in Permit Compliance System/Integrated Compliance Information System-NPDES (PCS/ICIS-NPDES); and
  - implement reporting tools, such as e-NOIs for use by States.
- b. Sponsor training workshops to support NPDES program Permitting for Environmental Results initiatives. Proposals are expected to address:
  - program areas where information sharing is needed to effectively implement the NPDES program, including permit practitioners' training and pretreatment workshop.

## 9. Cooling Water Intake Structures (Clean Water Act, Section 316(b))

- a. Develop and/or demonstrate innovative or alternative technologies for the reduction of impingement mortality and entrainment of aquatic organisms at cooling water intake structures;
- b. Plan and coordinate technical workshops and/or training for permit writers and permitees on technical issues associated with developing permits for cooling water intake structures;
- c. Develop tools to measure or assess effectiveness of technologies, operational, and restoration measures in reducing impingement mortality and entrainment of aquatic organisms at cooling water intake structures.

#### 10. Youth and the Environment

a. Training programs to introduce economically disadvantaged urban and rural high school students to various occupational opportunities in the water and wastewater arena through summer internships at wastewater treatment plants.

## 11. Decentralized Wastewater Treatment Systems (Septics)

- a. Develop studies, evaluations or tools to assist in the evaluation of appropriate soil-based onsite and cluster technologies by states and local regulators and communities.
- b. Develop training and outreach tools to educate elected officials and community decision-makers on the need for improved regulatory and management programs.
- c. Develop unique approaches to improving and sustaining management programs in rural and economically-stressed communities.
- d. Development and demonstration of a study protocol to determine the nationwide magnitude of malfunctioning on-site and decentralized wastewater management systems, and characterize associated impacts on surface and ground water quality.

## 12. Monitoring and Assessment for Environmental Results

- a. Provide databases, tools and assistance to State monitoring organizations to improve water quality monitoring and assessments used to evaluate progress over time. Proposed projects are expected to:
  - Assist States in identifying or developing efficient means to manage data and improve data quality in local versions of the STORET Water Quality System, the Assessment Database (ADB), including the locations of monitoring sites and assessment units on the National Hydrography Dataset;
  - Facilitate or promote the demonstration and development of new or improved databases that store water quality monitoring and assessment results and associated locational (georeferencing) data in more efficient, cost-effective ways; and
  - Facilitate or promote the demonstration and development of new, innovative reporting and analysis tools, such as Geographic Information Systems, for use by States.
- b. Sponsor training sessions and provide on-site assistance to support monitoring and assessment initiatives. Proposals are expected to address program areas where information sharing is needed to effectively implement State monitoring and assessment programs, including STORET and ADB training sessions.

#### **II. Award Information**

The Office of Wastewater Management estimates that approximately \$4.2 million will be available to fund projects selected as a result of this solicitation through cooperative agreements or grants. The number of projects selected for award depends on final Congressional budget action but it is currently estimated that 35 grants will be awarded. Selected projects may be partially funded. No out-year funding for this program is anticipated. It is expected that awards will be made approximately six to eight weeks after full applications are submitted. The award amounts will range from \$10,000 to \$500,000 except for Youth and the Environment grants which will have a minimum award amount of \$2000. The Office of Wastewater Management is reserving \$200,000 of the \$4.2 million for Cooling Water Intake projects.

# **III.** Eligibility Information

- **A. Eligible Applicants**: State governments; Indian Tribes; Interstate agencies; public organizations; and non-profit organizations.
- **B.** Cost Sharing or Matching: This program does not require cost sharing or matching as an eligibility criteria; however, offers to share cost may be considered as an evaluation factor under Item V.6.
- C. Threshold Eligibility Criteria: Proposals to purchase land, perform construction,

fail

to conform to the submission requirements of this announcement or appear to be from a for-profit organization will not be reviewed or considered. Proposals for Youth and the Environment projects in states in EPA Region 4 (Alabama, Florida, Georgia, Kentucky, Mississippi, North Carolina, South Carolina, and Tennessee) will not be considered for award.

- **D.** Timing of Eligibility: The applicant must be eligible for award consideration at the time of proposal submission.
- **E. Other Eligibility Criteria**: Proposals must address one of the subject areas described in Section I.

# IV. Application and Submission Information

A. Address to Submit Proposals: It is preferred that proposals be electronically submitted using www.grants.gov apply systems. If mailed through the postal service or other means, three copies should be sent to: Barry Benroth, 4204M, WQCA 2005, U. S. Environmental Protection Agency, 1200 Pennsylvania Avenue, NW, Washington, DC, 20460. The following address must be used for delivery of the copies by an overnight delivery or courier service: Barry Benroth, 4204M, WQCA 2005, Phone 202-564-0672, U. S. Environmental Protection Agency, Room 7324 J, EPA East, 1201 Constitution Avenue, NW, Washington, DC 20004. No proposals will be accepted by facsimile machine submission.

**B.** Content and Form of Proposal Submission: Required forms include an SF 424, SF - 424A Budget Sheet, Contact information, Project Narrative Form, and a Proposal limited to four pages. Pages in excess of four will not be considered. Full application packages should not be submitted at this time. Do not submit a full federal grant application in response to this RFP. If your proposal is selected for funding, a federal project officer will request an application from you, negotiate the workplan and budget and oversee the process of awarding the assistance agreement. It is recommended that confidential information not be included in the proposal. The following format should be used for all proposals:

Electronic transmittal of proposals using the electronic applications package available at <a href="http://apply.grants.gov/forms\_apps\_idx.html">http://apply.grants.gov/forms\_apps\_idx.html</a> is preferred to facilitate the review process. Hard copies are acceptable and the required forms can be downloaded from <a href="http://www.epa.gov/ogd/forms/forms.htm">http://www.epa.gov/ogd/forms/forms.htm</a>. Please send three copies of the proposal if it is not electronically transmitted.

In order to view the application package, go to <a href="http://www.grants.gov">http://www.grants.gov</a> and download the PureEdge viewer (hyperlink available under "Get Started Step 2"). You may then access the application package at <a href="https://apply.grants.gov/forms\_apps\_idx.html">https://apply.grants.gov/forms\_apps\_idx.html</a> using either the CFDA number of 66.463 or Funding Opportunity Number EPA-OW-OWM-05-01.

The actual application submission must be made by a representative registered with <a href="http://www.grants.gov/">http://www.grants.gov/</a>. Please see <a href="http://www.grants.gov/">http://www.grants.gov/</a>, "Get Started" for further information. *Please allow at least a week for the registration process to complete.* Please check with your Sponsored Programs, or equivalent, office to see if your institution or organization is registered. If not, encourage them to begin the process immediately.

The following information must be included in the proposal (Attach to Project Narrative Form):

*Name of Project:* 

*Point of Contact*: (Individual and Organization Name, Address, Phone number, Fax Number, E-mail Address)

*Is This a Continuation of a Previously Funded Project* (if so, please provide the number and status of the current grant or cooperative agreement):

Proposed Award Amount:

*Proposed Awardee Cost Share*: (Cost sharing is not required but may be a factor in consideration)

Description of General Budget Proposed To Support Project:

Project Topic Area: (based on topic areas of interest shown above in Section I.B.)

Project Description:

Expected Accomplishments of Product, With Dates, Environmental Results and Interim Milestones: This section should also include a discussion of a communication plan for distributing the project results to interested parties.

Describe How the Project Meets the Evaluation Criteria Specified Below: in Section V.A.

C. Submission Dates and Times: Proposals must be submitted by 60 days after the date

of posting of this announcement. Proposals not received by midnight, Eastern Daylight Time, on April 22, 2005, will not be considered for award.

- **D.** Intergovernmental Review: Executive Order 12372, Intergovernmental Review of Federal Programs may be applicable to awards, resulting from this announcement. Applicants selected for funding may be required to provide a copy of their proposal to their State Point of Contact (SPOC) or the States where the project will be conducted for review, pursuant to Executive Order 12372, Intergovernmental Review of Federal Programs. This review is not required with the proposal and not all states require such a review.
- **E. Funding Restrictions**: Total funding available for award by Headquarters will depend on EPA's appropriation for Fiscal Year 2005; however, it is estimated that \$4.2 million will be available for funding approved projects. Construction projects, except for the construction required to carry out a demonstration project, and acquisition of land, are not eligible for funding under this program.
- **F. Proprietary Information Identification**: EPA recommends that no confidential information be included in proposals. However, in accordance with 40 CFR 2.203, applicants may claim all or a portion of their application/proposal as confidential business information. EPA will evaluate confidentiality claims in accordance with 40 CFR Part 2. Applicants must clearly mark applications/proposals or portions of applications/proposals they claim as confidential. If no claim of confidentiality is made, **EPA is not required to make the inquiry to the applicant otherwise required by 40 CFR 2.204(c)(2) prior to disclosure.**
- **G. Other Submission Requirements**: All applicants are required to provide a Dun and Bradstreet (D&B) Data Universal Number System (DUNS) number when applying for a Federal grant or cooperative agreement. Applicants can receive a DUNS number, at no cost, by calling the dedicated toll-free DUNS Number request line at 1-866-705-5711, or visiting the D&B website at: <a href="http://www.dnb.com">http://www.dnb.com</a>.

## V. Application Review Information

- **A. Criteria**: EPA will award Water Quality Cooperative Agreements on a competitive basis and evaluate eligible proposals based on the criteria detailed below (maximum points for each element are shown). In addition to the selection criteria detailed below, other factors such as geographic diversity, programmatic priorities, project diversity and program diversity may be considered in selecting proposals for award.
  - 1. The extent to which the proposed project effectively leads to the protection of water quality as identified by the priorities in this notice (Section I.A). These priorities reflect EPA's Strategic Goal 2. Clean and Safe Water, Subobjective 2.2.1 Improve Water Quality on a Watershed Basis. (25)
  - 2. The extent to which the results of the proposed project, or tools developed, can be transferred to others and the quality of the communication strategy to actually achieve the transfer. (25)
  - 3. The realistic expectation that meaningful environmental benefit will result from

- the proposed work, and the quality of the evaluation component to assess or measure the environmental outcome(s). This may include projects that improve program integrity or efficiency as well as those with direct environmental benefits. (20)
- 4. The capability of the applicant to effectively perform and complete the tasks and deliver the products of the project or activity, to include results of a pre-award review for non-profit organizations, if required. (15)
- 5. Cost effectiveness and reasonableness of the proposal. (15)
- 6. While cost sharing is not required, EPA will consider an applicant's offer to voluntarily share cost or leverage other resources. Cost shares must be comprised of eligible and allowable cost. Applicants may also discuss how EPA funding will leverage other resources, even though the leveraged resources would not be eligible and allowed cost, e.g. construction of a building. (5)

The eligible proposals will be evaluated by EPA staff on the elements shown above. During the review process, significant consideration will be given to the expectations outlined in the Topic Areas (Section I.B.). Proposed projects must meet the applicable statutory and regulatory requirements. Proposals which are not in compliance with the notice, *i.e.*, do not provide the required information, are submitted by ineligible applicants, are considered to be primarily construction projects, or are for acquisition of land will not be considered.

- **B. Review and Selection Process**: Each eligible proposal will be evaluated and ranked by a panel comprised of EPA employees. The review panel will base its evaluation on the selection criteria disclosed in this notice (Section V.A.). Final selection decisions, which will be made by EPA Headquarters staff, will be based on the evaluations conducted by the review panels and may also take into account the other factors described in Section V.A. such as geographic diversity, programmatic priorities, project diversity and program diversity.
- **C. Anticipated Announcement and Award Dates**: This is the estimated schedule of activities for submission, review of proposals and notification of selections:

April 22, 2005 - Proposals due to EPA

June 22, 2005 - Initial approvals identified and sponsors of projects selected for funding will be requested to submit a formal application package.

Schedule may be modified based on the level of response.

#### VI. Award Administration Information

**A. Award Notices**: Final selection of proposals will be made by the Director, Office of Wastewater Management. Selected organizations will be notified and requested to submit a full application. Unsuccessful applicants will be notified by e-mail. A list of selected projects will be posted on the Office Wastewater Management web site <a href="http://www.epa.gov/owm/wqca/2005.htm">http://www.epa.gov/owm/wqca/2005.htm</a>. This web site may also contain additional information about this request. Deadline extensions, if any, will be posted on this web site.

B. Administrative and National Policy Requirements: It is expected that most of the

awards under this program will be cooperative agreements. States, interstate agencies, federally recognized Tribes, and intertribal consortia meeting the requirements at 40 CFR 35.504 may include the funds for Water Quality Cooperative Agreements(WQCA) in a Performance Partnership Grant (PPG) in accordance with the regulations governing PPGs at 40 CFR Part 35 subparts A and B. For states and interstate agencies that choose to do so, the regulations provide that the work plan commitments that would have been included in the WQCA must be included in the PPG work plan. A description of the Agency's substantial involvement in cooperative agreements will be included in the final agreement. Selected applicants must be in accordance with EPA's quality system.

- **C. Reporting**: All WQCAs are currently covered under the following EPA grant regulations: 40 CFR Part 31 (States, Tribes, interstate agencies, intertribal consortia and local governments) and 40 CFR Part 35, Subpart A (States, interstate agencies and local governments) and Subpart B (Tribes and intertribal consortia). These regulations specify basic grant reporting requirements, including performance and financial reports (see 40 CFR 30.52, 31.40, 31.41, 35.115, and 35.515). In negotiating these grants, EPA will work closely with recipients to incorporate appropriate performance reporting requirements into each grant agreement consistent with 40 CFR 31.40, 35.115, and 35.515. These regulations provide some flexibility in determining the appropriate content and frequency of performance reports. Typically, the reporting schedule requires the recipient to report quarterly. Recipients will be required to report direct and indirect environmental benefits that result from the work accomplished through the cooperative agreement award.
- **D. Dispute Procedures**: Assistance agreement competition-related disputes will be resolved in accordance with the dispute resolution procedures published in 70 FR (Federal Register) 3629, 3630 (January 26, 2005) which can be found at: http://a257.g.akamaitech.net/7/257/2422/01jan20051800/edocket.access.gpo.gov/2005/05-1371.htm. Copies may also be requested by contacting the Agency Contact below.

#### VII. Agency Contact

Barry Benroth, WQCA Officer, Office of Wastewater Management, Mail Code 4204 M, Room 7324 G, EPA East, 1200 Pennsylvania Avenue, NW, Washington, DC, 20460, Phone 202-564-0672, Fax 202-501-2397, E-mail <a href="mailto:benroth.barry@epa.gov">benroth.barry@epa.gov</a>.

#### **VIII. Other Information**

EPA reserves the right to reject all proposals or applications and make no award as a result of this announcement. The EPA Grant Award Officer is the only official that can bind the Agency to the expenditure of funds for selected projects resulting from this announcement.